

Title (en)
SELF-ACTIVATED POLYMER PARTICLES WITH A NARROW SIZE DISTRIBUTION AND PROCEDURE FOR PRODUCTION THEREOF

Title (de)
SELBSTAKTIVIERTE POLYMERPARTIKEL MIT ENGER GRÖSSENVERTEILUNG UND VERFAHREN ZU IHRER HERSTELLUNG

Title (fr)
PARTICULES POLYMERES AUTO-ACTIVEES A GRANULOMETRIE RESSERREE ET PROCEDE DE PRODUCTION

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Application
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Abstract (en)
[origin: WO9831714A1] The production of activated polymer particles of vinyl monomers with a narrow size distribution in accordance with a special precipitation polymerisation process in a polar organic medium, possibly in an organic polar medium mixed with water. The medium is characterised in that it is a good solvent for the monomer and a poor solvent for the polymer. The polymerisation takes place with a temperature profile which increases the conversion speed, reduces the particle distribution and produces a scattered chain length distribution. The method for producing the particles also produces an increased degree of freedom for the production of particles with a certain particle size in a given conversion time. The particles, which can be cross-linked, can also be activated either by an active group through copolymerisation or by grafting reactions at a late stage of polymerisation or in a subsequent treatment stage. To make it easier to use the particles as seed in polymerisation with vinyl monomers, the present invention entails the particles containing a fraction of molecules with shorter chain lengths and possibly residues of an oil-soluble initiator.

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